

A RECONSIDERATION OF THE CORRECT NAME FOR THE HAWAIIAN GOSSYPIMUM.

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Wilbur (1964) proposed rejection of the name *Gossypium tomentosum* Nutt. ex Seem. for the native Hawaiian cotton, and acceptance of the next oldest valid name, *G. sandvicense* Parl. His basis for the rejection of Seemann's (1865) name is that Seemann's original conception of the species was too broad, encompassing plants both from Hawaii, where the species in question occurs, and from Fiji, where it does not.

Wilbur clearly documents the fact that Seemann's description is heterogeneous, as Watt (1907) had noted earlier, and that it was derived both from Hawaiian specimens of *G. tomentosum* and from Fijian specimens that have been described under the name *G. taitense* Parl., but which are now generally included in *G. hirsutum* L. Wilbur thereupon attempted to lectotypify Seemann's name by circumscription: he stated that "*G. tomentosum* must be typified by the plants principally characterized by the publishing author. . . ." He then expressed the opinion that the description is more heavily weighted toward the Fijian element than the Hawaiian element, stating that "it is readily apparent that the greater portion of Seemann's original diagnosis can apply only to the Fijian cotton." His opinion is surely subject to challenge. One could, for example, note that Seemann cited three specimens from Fiji (Smythe, Pritchard, and Seemann) and four specimens from Hawaii (Diell, Nelson, Menzies, and Nuttall) as well as a specimen of Trove "from Joynegau" which Watt (1907, p. 129) indicates is a specimen of Hove "from Joynegare" (=Junagadh, Kathiawar), located in western India. On such a basis, one might equally well conclude that the Hawaiian element rather than the Fijian element "predominated" in Seemann's conception of the species.

More to the point, perhaps, is a re-examination of Seemann's description and Wilbur's analysis of it. Wilbur notes three items (stipules, bract teeth, and seed hairs) that favor the Fijian element in Seemann's description and only one (calyx form) that favors the Hawaiian. I agree with Wilbur's interpretation of bract teeth, seed hairs, and calyx form, but not that of the stipules. (I do not believe any conclusion can be reached for this item, because of the variability in these plants of the stipules, which differ in vegetative and reproductive branches. Apparently neither Seemann nor Wilbur was aware of this fact, and the descriptive terminology employed does not permit any conclusion to be reached concerning the origin of the specimens whose stipules Seemann described.) Moreover, Wilbur overlooked two items (corolla color and indumentum) that tend

to favor the Hawaiian element. Therefore, one cannot conclude that either the Fijian or the Hawaiian element "predominated" in Seemann's description, but only that the description is indeed composite. Wilbur also failed to consider the extent to which the description might have been based upon Hove's plant from India.

However, such attempts to express a value judgement are beside the point. The problem of the correct application of the name *G. tomentosum* is to be resolved on the basis of typification. Wilbur rightly emphasized the importance of lectotypification in resolving this question, but curiously failed to choose a lectotype.

I designate Nuttall's specimen, bearing his manuscript name and kept at the British Museum (Natural History), as the lectotype of *Gossypium tomentosum* Nutt. ex Seem. Nuttall's specimen is the one from which Seemann took the name, and it may be viewed as the "holotype" of Nuttall's unpublished name, which Seemann subsequently published. It therefore seems the most appropriate choice as lectotype of Seemann's name. Such a choice preserves established usage. I see no advantage to a lectotypification that upsets established usage and is therefore contrary to Recommendation 7B of the Code, as was suggested (although not done) by Wilbur. That Seemann included Fijian and Indian material in his citation of specimens and utilized them to a degree in drafting his description, was simply a taxonomic error on his part that need not deflect us from making a correct nomenclatural decision. The problem is indeed resolved by a satisfactory typification.

The name that Wilbur concluded was the correct one for the Hawaiian endemic, *G. sandvicense* Parl. (Parlatore, 1866), was published one year later than *G. tomentosum*, and is thus to be relegated to synonymy under the latter name, as most authors have done. Parlatore's name has evidently never been typified, and so I will take this opportunity to rectify that omission. Parlatore cites specimens of Forster, Menzies, and Nuttall (the last-named cited with a question mark) following his description of the species, all collected in the Sandwich Islands (i.e., Hawaii). Only Menzies' specimen is cited with an exclamation point (the usual indication that a specimen was actually examined) and mentioned in the subsequent discussion. Therefore, I designate Menzies' specimen as lectotype of *Gossypium sandvicense* Parl. That the same specimen was cited by Seemann, underscores the synonymy noted above. Aliotta (1903) notes the lectotype to be in the "Erbario Centrale Italiano" in Florence (FI).

REFERENCES

- ALIOTTA, A. 1903. Revista critica del genere *Gossypium*. Della Torre: Portici. [cf. *G. tomentosum* on pp. 92-94.]
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